

BACTERIAL LEAF SPOT OF SAUCER MAGNOLIA

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Saucer magnolia, *Magnolia soulangeana* Soul., is a hardy, deciduous tree which grows to about 20 ft in height. It bears a profusion of 6-inch flowers that are creamy white within and purplish outside, which appear just before leafing out. It is an excellent flowering tree for north Florida (1).

Pseudomonas syringae van Hall is a bacterium which has a wide host range and is worldwide in distribution (2). It causes a very serious disease on stone fruits in much of the southeastern United States (4), and was recently found on peach in Florida (3). A leaf spot incited by *P. syringae* is becoming fairly common on saucer magnolia in north Florida nurseries.

SYMPTOMS. The leaf spots begin as tiny water-soaked areas, which later become dry and vein-delimited, giving an angular appearance (fig. 1). The lesions are dark gray to brown and may be surrounded by an irregular yellow halo when young. The halo disappears as the lesions become older. The younger leaves are most easily infected by this bacterium.

CONTROL. Spread of the disease is probably by splashing water; thus, overhead irrigation should be avoided where possible. Good aeration and plant separation allows the foliage to dry more quickly, thus helping to reduce disease severity. Experimental applications of a basic copper fungicide or copper plus maneb may help protect healthy foliage. Streptomycin sulfate at 50-100 ppm may be tried alternately with the copper sprays.

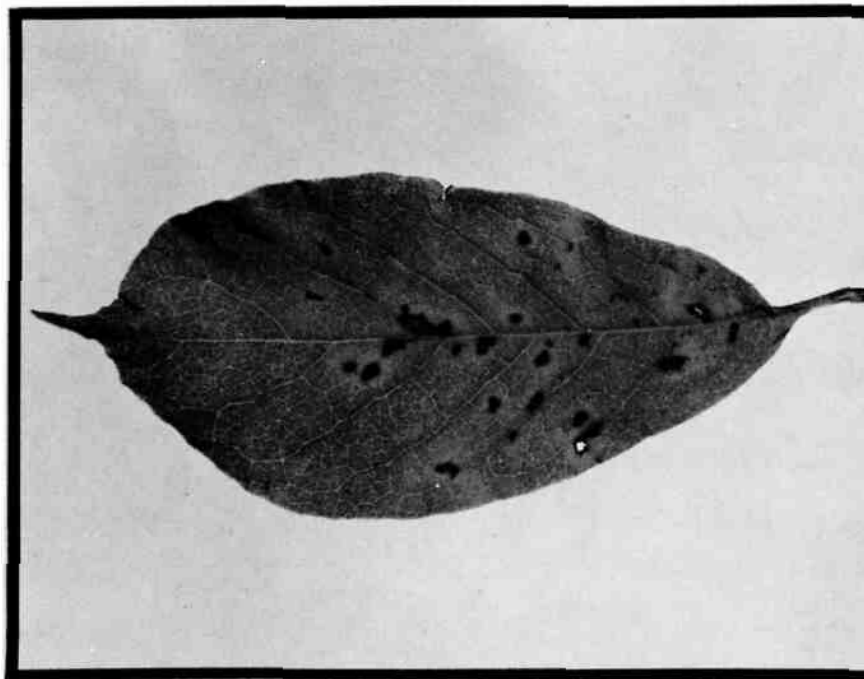


Fig. 1. *Pseudomonas syringae* on *Magnolia soulangeana* showing the angular leaf spots and chlorotic halos surrounding the lesions.

Literature Cited

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3. French, W. J., and J. W. Miller. 1973. Bacterial canker of peach in Florida Proc. Fla. State Hort. Soc. 86:310-311.
4. Peterson, D. H., and W. M. Dowler. 1965. Bacterial canker of stone fruit in the southeastern states. Plant Dis. Repr. 49:701-702.